

IDENTIFICATION

PRODUCT CODE: MAINDEC-8E-D01B-D
PRODUCT NAME: BASIC JMP-JMS TEST
DATE CREATED: JUNE 11, 1971
MAINTAINER: DIAGNOSTICS GROUP
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1. ABSTRACT

THIS IS A DIAGNOSTIC PROGRAM FOR TESTING THE JMP AND JMS INSTRUCTIONS OF THE PDP-8E.
2. REQUIREMENTS

 - 2.1 EQUIPMENT

A PDP-8E EQUIPPED WITH TELETYPE.
 - 2.2 STORAGE

THIS PROGRAM USES MOST OF MEMORY. THE BINARY LOADER MUST BE STORED IN THE LAST MEMORY PAGE.
 - 2.3 PRELIMINARY PROGRAMS

MAINDEC-8E-DBA(N) AND MAINDEC-8E-DOB(N)
3. LOADING PROCEDURE

 - 3.1 METHOD

THE STANDARD BINARY LOADER IS USED.
4. STARTING PROCEDURE

 - 4.1 CONTROL SWITCH SETTINGS (NONE)

 - 4.2 STARTING ADDRESS

200
 - 4.3 RESTART ADDRESSES

600
704
 - 4.4 OPERATOR ACTION

A. SET SR TO 200 AND PRESS LOAD ADDRESS.
B. PUSH CLEAR AND THEN CONTINUE. THE PROGRAM WILL STORE PARTS OF THE RIM AND BINARY LOADERS THAT WILL BE DESTROYED, AND THEN JMP TO 4200 TO BEGIN TESTING.
5. OPERATING PROCEDURES

 - 5.1 PROGRAM RESTARTS

SINCE THE LOADERS ARE ALREADY STORED, A PROGRAM RESTART SHOULD BEGIN AT 600 NOT 200.
 - 5.2 PROGRAM END

TO RESTORE THE LOADERS AT THE CONCLUSION OF THE TEST, START AT 704. WHEN THE PROGRAM HALTS, RESTORATION IS COMPLETED (PC=736).
6. ERRORS

 - 6.1 ERROR HALTS AND DESCRIPTION

SEE SECTION 9.
 - 6.2 ERROR RECOVERY

IN MOST CASES IT IS POSSIBLE TO INSERT A JMP INSTRUCTION IN THE ERROR HALT POSITION TO RETURN THE PROGRAM TO THE FAILING TEST. THIS FORMS A PROGRAM LOOP ON THE FAILING TEST AND ALLOWS THE PROBLEM TO BE INVESTIGATED WITH AN OSCILLOSCOPE. IN CASES WHERE A SCOPE MODE LOOP CANNOT BE MAINTAINED DUE TO THE INSTABILITY OF THE JMP OR JMS INSTRUCTION AND ITS FAILING CONDITION, IT WILL PROBABLY BE ADVANTAGEOUS TO SIMULATE THIS SAME PROBLEM USING THE RANDOM JMP TEST, MAINDEC-8E-DBHC, OR RANDOM JMP-JMS TEST, MAINDEC-8E-DBJC.
7. RESTRICTIONS (NONE)

8. MISCELLANEOUS

 - 8.1 EXECUTION TIME

THREE HUNDRED AND FORTY-FIVE PROGRAM LOOPS PER SECOND. A BELL IS SOUNDED EVERY 10 SECONDS, WHICH EQUALS 3456 PROGRAM LOOPS.

9. PROGRAM DESCRIPTION

THE PROGRAM IS MADE UP OF 82 INDIVIDUAL TESTS FOR JMP AND JMS. AN OCTAL COUNTER LOCATED AT MEMORY LOCATION 0136 ALWAYS HOLDS THE NUMBER OF THE PRESENT TEST. FOR TEST 1 LOCATION, 0136 CONTAINS 0000 AND FOR TEST 82, 0136 CONTAINS 0121. EACH TEST PERFORMS THE FOLLOWING FUNCTIONS:

- A. CHECK LOCATION 0136 FOR PROPER TEST NUMBER.
- B. PERFORMS ADDITIONAL CHECKING SUCH AS VERIFICATION OF THE STORED PC (PROGRAM COUNTER) ON A JMS.
- C. ADVANCES TEST COUNTER.
- D. SETS UP FOR NEXT TEST.
- E. JMP'S OR JMS'S TO THE NEXT TEST. THESE JMP AND JMS INSTRUCTIONS ARE THE ONES BEING TESTED.

IF THE PC DOES NOT ARRIVE AT THE PROPER PLACE AFTER PERFORMING STEPS ABOVE, IT EITHER FALLS INTO THE BACKGROUND FIELD OF HLTS OR INTO ANOTHER AREA OF THE PROGRAM. IF THE FIELD OF HLTS IS ENCOUNTERED, THE PROGRAM HALTS IMMEDIATELY. IF A PROGRAM FIELD IS ENTERED, IT IS MOST LIKELY THAT THE PROGRAM WILL HALT WHEN THE TEST COUNTER CHECK IS MADE (LOCATION 136 EQUALS THE TEST COUNT). IN A FEW REMOTE CASES IT IS POSSIBLE FOR THE TEST COUNTER TO BE ADVANCED BY ONE, FOLLOWING THE ERRONEOUS JMP OR JMS AND BEFORE THE HALT. IT IS ALSO POSSIBLE FOR THE PROGRAM, ON A ERROR CONDITION, TO ENTER THE LOADERS STORED IN THE LAST MEMORY PAGE. ALL OF THESE POSSIBILITIES SHOULD BE KEPT IN MIND WHEN ANALYZING AN ERROR.

TEST 0 THROUGH 19 ARE TESTS FOR SAME PAGE JUMPING USING DIRECT ADDRESSING. TESTS 20 THROUGH 45 TEST THE JMP INSTRUCTION WITH INDIRECT ADDRESSING. IN THESE CASES, THE ADDRESS THAT THE PROGRAM JUMPS TO IS ALWAYS THE COMPLEMENT OF ITS PRESENT ADDRESS. JMS TESTS 1 THROUGH 12 ARE TESTS FOR THE SAME PAGE USING DIRECT ADDRESSING. JMS TESTS 13 THROUGH 35 TEST JMS IN THE SAME MANNER AS JMP IS TESTED IN TEST 20 THROUGH 45.

THE TELETYPE BELL IS SOUNDED EVERY 10 SECONDS (3456 PROGRAM CYCLES).

/BASIC JMP-JMS TEST PAL10 V141 9-JUN-71 15147 PAGE 1

/BASIC JMP-JMS TEST

0000	0000	*0	
0001	0001		0
0002	0002		JMP 1
0003	0003		2
0004	0004		3
0005	0005		0
0006	7402		HLT
0007	7402		HLT
0008	7402		HLT
0009	7402		HLT
0010	7402		HLT
0011	7402		HLT
0012	7402		HLT
0013	7402		HLT
0014	7402		HLT
0015	7402		HLT
0016	7402		HLT
0017	7402		HLT
0018	7402		HLT
0019	7402		HLT
0020	0020	*22	
0021	0021	K0,	0
0022	0022	K1,	1
0023	0023	K2,	2
0024	0024	K4,	4
0025	0025	K10,	10
0026	0026	K20,	20
0027	0027	K40,	40
0028	0028	K100,	100
0029	0029	K200,	200
0030	0030	K400,	400
0031	0031	K1000,	1000
0032	0032	K2000,	2000
0033	0033	K4000,	4000
0034	0034	K10000,	10000
0035	0035	K20000,	20000
0036	0036	K40000,	40000
0037	3777	K3777,	3777
0038	0042	*42	
0039	5777	K5777,	5777
0040	6777	K6777,	6777
0041	7377	K7377,	7377
0042	7577	K7577,	7577
0043	7677	K7677,	7677
0044	7737	K7737,	7737
0045	7757	K7757,	7757
0046	7767	K7767,	7767
0047	7773	K7773,	7773
0048	7775	K7775,	7775
0049	7776	K7776,	7776
0050	7777	K7777,	7777
0051	4620	K4620,	4620
0052	4640	K4640,	4640
0053	4660	K4660,	4660
0054	4700	K4700,	4700
0055	4720	K4720,	4720

0063 4740 K4740, 4740
 0064 4760 K4760, 4760
 0065 5000 K5000, 5000
 0066 5020 K5020, 5020
 0067 5040 K5040, 5040

0070 5060 K5060, 5060
 0071 5100 K5100, 5100
 0072 5120 K5120, 5120
 0073 5140 K5140, 5140
 0074 5160 K5160, 5160
 0075 5200 K5200, 5200
 0076 5220 K5220, 5220
 0102 5240 K5240, 5240
 0103 5260 K5260, 5260
 0104 5300 K5300, 5300
 0105 5320 K5320, 5320
 0106 5340 K5340, 5340
 0107 5360 K5360, 5360
 0110 5400 K5400, 5400
 0111 5420 K5420, 5420
 0112 5440 K5440, 5440
 0113 7777 M1, -1
 0114 7776 M2, -2
 0115 7775 M3, -3
 0116 7774 M4, -4
 0117 7773 M5, -5
 0120 7772 M6, -6
 0121 7771 M7, -7
 0122 7770 M10, -10
 0123 7767 M11, -11
 0124 7766 M12, -12
 0125 7765 M13, -13
 0126 7764 M14, -14
 0127 7763 M15, -15
 0130 7762 M16, -16
 0131 7761 M17, -17
 0132 7760 M20, -20
 0133 7757 M21, -21
 0134 7756 M22, -22
 0135 7755 M23, -23
 0136 0000 PNTCNT, 0
 0137 2410 K2410, 2410
 0140 2440 K2440, 2440
 0141 2470 K2470, 2470
 0142 2520 K2520, 2520
 0143 2600 K2600, 2600
 0144 2630 K2630, 2630
 0145 2660 K2660, 2660
 0146 2710 K2710, 2710
 0147 2740 K2740, 2740
 0150 3000 K3000, 3000
 0151 3030 K3030, 3030

0152 3060 K3060, 3060
 0153 3110 K3110, 3110
 0154 3140 K3140, 3140
 0155 3200 K3200, 3200

0156 3230 K3230, 3230
 0157 3260 K3260, 3260
 0160 3310 K3310, 3310
 0161 3340 K3340, 3340
 0162 3400 K3400, 3400
 0163 3430 K3430, 3430
 0164 3460 K3460, 3460
 0165 3510 K3510, 3510
 0166 3540 K3540, 3540

0170 0170 *170
 0170 0000 DO, 0
 0171 1175 TAD K7402
 0172 3410 DCA I 10
 0173 1010 TAD 10
 0174 5570 JMP I DO
 0175 7402 K7402, 7402

0200 0200 *200
 0200 5601 JMP I SAVER
 0201 0600 SAVER, SAVE

/STORE LOADER INSTRUCTIONS
 /THAT WILL BE DESTROYED

0600 0600 *600
 0600 7200 SAVE, CLA
 0601 1453 TAD I K7775
 0602 3343 DCA STOR
 0603 1452 TAD I K7773
 0604 3344 DCA STOR+1
 0605 1736 TAD I K74
 0606 3345 DCA STOR+2
 0607 1451 TAD I K7767
 0610 3346 DCA STOR+3
 0611 1737 TAD I K70
 0612 3347 DCA STOR+4
 0613 1450 TAD I K7757
 0614 3350 DCA STOR+5
 0615 1740 TAD I K60
 0616 3351 DCA STOR+6
 0617 1447 TAD I K7737
 0620 3352 DCA STOR+7
 0621 1741 TAD I K740
 0622 3353 DCA STOR+10


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0623 1446 TAD I K7677
0624 3354 DCA STOR+11
0625 1742 TAD I K00
0626 3355 DCA STOR+12
0627 1455 TAD I K7777
0630 3356 DCA STOR+13
0631 7300 HALT1, CLA CLL
0632 1264 TAD K175
0633 3010 DCA 10
0634 4170 JMS DO
0635 1265 TAD M577
0636 7640 SZA CLA
0637 5234 JMP .-3
0640 1266 HALT2, TAD K756
0641 3010 DCA 10
0642 4170 JMS DO
0643 1267 TAD M1777
0644 7640 SZA CLA
0645 5242 JMP .-3
0646 1270 HALT3, TAD K3572
0647 3010 DCA 10
0650 4170 JMS DO
0651 1271 TAD M4177
0652 7640 SZA CLA
0653 5250 JMP .-3
0654 1272 HALT4, TAD K5451
0655 3010 DCA 10
0656 4170 JMS DO
0657 1273 TAD M7600
0660 7640 SZA CLA
0661 5256 JMP .-3
0662 5300 JMP RESTAR
0663 4200 BEGIN
0664 0175 K175, 175
0665 7201 M577, -577
0666 0756 K756, 756
0667 6001 M1777, -1777
0670 3572 K3572, 3572
0671 3601 M4177, -4177
0672 5451 K5451, 5451
0673 0200 M7600, -7600

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/RESTORE LOADER INSTRUCTIONS

```

0700 0700 *700
0700 1303 RESTAR, TAD RENEW
0701 3200 DCA SAVE
0702 5303 JMP RENEW
0703 5663 RENEW, JMP I HALT4+7
0704 7200 REFILL, CLA
0705 1343 TAD STOR
0706 3453 DCA I K7773
0707 1344 TAD STOR+1
0710 3452 DCA I K7773

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0711 1345 TAD STOR+2
0712 3736 DCA I K74
0713 1346 TAD STOR+3
0714 3451 DCA I K7767
0715 1347 TAD STOR+4
0716 3737 DCA I K70
0717 1350 TAD STOR+5
0720 3490 DCA I K7757
0721 1351 TAD STOR+6
0722 3740 DCA I K60
0723 1352 TAD STOR+7
0724 3447 DCA I K7737
0725 1353 TAD STOR+10
0726 3741 DCA I K740
0727 1354 TAD STOR+11
0730 3446 DCA I K7677
0731 1355 TAD STOR+12
0732 3742 DCA I K00
0733 1356 TAD STOR+13
0734 3455 DCA I K7777
0735 7402 HLT

```

/CONSTANTS

```

0736 7774 K74, 7774
0737 7770 K70, 7770
0740 7760 K60, 7760
0741 7740 K740, 7740
0742 7700 K00, 7700
0743 0000 STOR, 0
0744 0000 0
0745 0000 0
0746 0000 0
0747 1742 -6036
0750 0000 0
0751 0000 0
0752 0000 0
0753 0000 0
0754 0000 0
0755 0000 0
0756 0000 0

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/STORE LOC 7775
/+1 STORE LOC 7773
/+2 STORE LOC 7774
/+3 STORE LOC 7767
/+4 STORE LOC 7770
/+5 STORE LOC 7757
/+6 STORE LOC 7740
/+7 STORE LOC 7737
/+10 STORE LOC 7740
/+11 STORE LOC 7677
/+12 STORE LOC 7700
/+13 STORE LOC 7777

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```

4200 4200 *4200
4200 7200 BEGIN, CLA
4201 3136 DCA PNTCNT

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4202 5203 /JUMP TEST 0 COUNTER=0
4203 1136 JMP .+1
4204 7440 TAD PNTCNT
4205 7402 SEA /CHECK COUNTER
4206 1136 HLT /JMP COUNTER WRONG
TAD PNTCNT

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4207	7001	IAC	/ADVANCE COUNTER
4210	3136	DCA PNTCNT	
/JUMP TEST 1 COUNTER=1			
4211	5213	JMP .+2	
4212	7402	HLT	/JMP FAILED
4213	1136	TAD PNTCNT	
4214	1113	TAD M1	
4215	7440	SEA	/CHECK COUNTER
4216	7402	HLT	/JMP COUNTER WRONG
4217	1136	TAD PNTCNT	
4220	7001	IAC	/ADVANCE COUNTER
4221	3136	DCA PNTCNT	
/JUMP TEST 2 COUNTER=2			
4222	5225	JMP .+3	
4223	7402	HLT	/JMP FAILED
4224	7402	HLT	
4225	1136	TAD PNTCNT	
4226	1114	TAD M2	
4227	7440	SEA	/CHECK COUNTER
4230	7402	HLT	/JMP COUNTER WRONG
4231	1136	TAD PNTCNT	
4232	7001	IAC	
4233	3136	DCA PNTCNT	
/JUMP TEST 3 COUNTER=3			
4234	5240	JMP .+4	
4235	7402	HLT	/JMP FAILED
4236	7402	HLT	/
4237	7402	HLT	/
4240	1136	TAD PNTCNT	
4241	1115	TAD M3	
4242	7440	SEA	/CHECK COUNTER
4243	7402	HLT	/JMP COUNTER WRONG
4244	1136	TAD PNTCNT	
4245	7001	IAC	/ADVANCE COUNTER
4246	3136	DCA PNTCNT	
/JUMP TEST 4 COUNTER=4			
4247	5254	JMP .+5	
4250	7402	HLT	/JMP FAILED
4251	7402	HLT	/
4252	7402	HLT	/
4253	7402	HLT	/
4254	1136	TAD PNTCNT	
4255	1116	TAD M4	
4256	7440	SEA	/CHECK COUNTER
4257	7402	HLT	/JMP COUNTER WRONG
4260	1136	TAD PNTCNT	
4261	7001	IAC	/ADVANCE COUNTER
4262	3136	DCA PNTCNT	
/JUMP TEST 5 COUNTER=5			

4263	5271	JMP .+6	
4264	7402	HLT	/JMP FAILED
4265	7402	HLT	/
4266	7402	HLT	/
4267	7402	HLT	/
4270	7402	HLT	/
4271	1136	TAD PNTCNT	
4272	1117	TAD M5	
4273	7440	SEA	/CHECK COUNTER
4274	7402	HLT	/JMP COUNTER WRONG
4275	1136	TAD PNTCNT	
4276	7001	IAC	/ADVANCE COUNTER
4277	3136	DCA PNTCNT	
/JUMP TEST 6 COUNTER=6			
4300	5307	JMP .+7	
4301	7402	HLT	/JMP FAILED
4302	7402	HLT	/
4303	7402	HLT	/
4304	7402	HLT	/
4305	7402	HLT	/
4306	7402	HLT	/
4307	1136	TAD PNTCNT	
4310	1120	TAD M6	
4311	7440	SEA	/CHECK COUNTER
4312	7402	HLT	/JMP COUNTER WRONG
4313	1136	TAD PNTCNT	
4314	7001	IAC	/ADVANCE COUNTER
4315	3136	DCA PNTCNT	
/JUMP TEST 7 COUNTER=7			
4316	5326	JMP .+10	
4317	7402	HLT	/JMP FAILED
4320	7402	HLT	/
4321	7402	HLT	/
4322	7402	HLT	/
4323	7402	HLT	/
4324	7402	HLT	/
4325	7402	HLT	/
4326	1136	TAD PNTCNT	
4327	1121	TAD M7	
4330	7440	SEA	/CHECK COUNTER
4331	7402	HLT	/JMP COUNTER WRONG
4332	1136	TAD PNTCNT	
4333	7001	IAC	/ADVANCE COUNTER
4334	3136	DCA PNTCNT	
/JUMP TEST 8 COUNTER=10			
4335	5346	JMP .+11	
4336	7402	HLT	/JMP FAILED
4337	7402	HLT	/
4340	7402	HLT	/
4341	7402	HLT	/
4342	7402	HLT	/


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4343 7402      HLT      /
4344 7402      HLT      /
4345 7402      HLT      /
4346 1136      TAD PNTCNT
4347 1122      TAD M10
4350 7440      SZA      /CHECK COUNTER
4351 7402      HLT      /JMP COUNTER WRONG
4352 1136      TAD PNTCNT
4353 7001      IAC      /ADVANCE COUNTER
4354 3136      DCA PNTCNT

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/JUMP TEST 9 COUNTER=11
4355 5367      JMP .+12
4356 7402      HLT      /JMP FAILED
4357 7402      HLT      /
4360 7402      HLT      /
4361 7402      HLT      /
4362 7402      HLT      /
4363 7402      HLT      /
4364 7402      HLT      /
4365 7402      HLT      /
4366 7402      HLT      /
4367 1136      TAD PNTCNT
4370 1123      TAD M11
4371 7440      SZA      /CHECK COUNTER
4372 7402      HLT      /JMP COUNTER WRONG
4373 1136      TAD PNTCNT
4374 7001      IAC      /ADVANCE COUNTER
4375 3136      DCA PNTCNT
4376 7000      NOP
4377 7000      NOP

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4400          *4400
/JUMP TEST 10 COUNTER=12
4400 5201      JMP .+1
4401 1136      TAD PNTCNT
4402 1124      TAD M12
4403 7440      SZA      /CHECK COUNTER
4404 7402      HLT      /JMP COUNTER WRONG
4405 1136      TAD PNTCNT
4406 7001      IAC      /ADVANCE COUNTER
4407 3136      DCA PNTCNT

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/JUMP TEST 11 COUNTER=13
4410 5212      JMP .+2
4411 7402      HLT      /JMP FAILED
4412 1136      TAD PNTCNT
4413 1125      TAD M13
4414 7440      SZA      /CHECK COUNTER
4415 7402      HLT      /JMP COUNTER WRONG
4416 1136      TAD PNTCNT
4417 7001      IAC      /ADVANCE COUNTER
4420 3136      DCA PNTCNT

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/JUMP TEST 12 COUNTER=14
4421 5224      JMP .+3
4422 7402      HLT      /JMP FAILED
4423 7402      HLT      /
4424 1136      TAD PNTCNT
4425 1126      TAD M14
4426 7440      SZA      /CHECK COUNTER
4427 7402      HLT      /JMP COUNTER WRONG
4430 1136      TAD PNTCNT
4431 7001      IAC      /ADVANCE COUNTER
4432 3136      DCA PNTCNT

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/JUMP TEST 13 COUNTER=15
4433 5237      JMP .+4
4434 7402      HLT      /JMP FAILED
4435 7402      HLT      /
4436 7402      HLT      /
4437 1136      TAD PNTCNT
4440 1127      TAD M15
4441 7440      SZA      /CHECK COUNTER
4442 7402      HLT      /JMP COUNTER WRONG
4443 1136      TAD PNTCNT
4444 7001      IAC      /ADVANCE COUNTER
4445 3136      DCA PNTCNT

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/JUMP TEST 14 COUNTER=16
4446 5253      JMP .+5
4447 7402      HLT      /JMP FAILED
4450 7402      HLT      /
4451 7402      HLT      /
4452 7402      HLT      /
4453 1136      TAD PNTCNT
4454 1130      TAD M16
4455 7440      SZA      /CHECK COUNTER
4456 7402      HLT      /JMP COUNTER WRONG
4457 1136      TAD PNTCNT
4460 7001      IAC      /ADVANCE COUNTER
4461 3136      DCA PNTCNT

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/JUMP TEST 15 COUNTER=17
4462 5270      JMP .+6
4463 7402      HLT      /JMP FAILED
4464 7402      HLT      /
4465 7402      HLT      /
4466 7402      HLT      /
4467 7402      HLT      /
4470 1136      TAD PNTCNT
4471 1131      TAD M17
4472 7440      SZA      /CHECK COUNTER
4473 7402      HLT      /JMP COUNTER WRONG
4474 1136      TAD PNTCNT
4475 7001      IAC      /ADVANCE COUNTER
4476 3136      DCA PNTCNT

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4477 5306      /JUMP TEST 16  COUNTER=20
4500 7402      JMP .+7
4501 7402      HLT          /JMP FAILED
4502 7402      HLT          /
4503 7402      HLT          /
4504 7402      HLT          /
4505 7402      HLT          /
4506 1136      TAD PNTCNT
4507 1132      TAD M20
4510 7440      SZA          /CHECK COUNTER
4511 7402      HLT          /JMP COUNTER WRONG
4512 1136      TAD PNTCNT
4513 7001      IAC          /ADVANCE COUNTER
4514 3136      DCA PNTCNT

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4515 5325      /JUMP TEST 17  COUNTER=21
4516 7402      JMP .+10
4517 7402      HLT          /JMP FAILED
4520 7402      HLT          /
4521 7402      HLT
4522 7402      HLT
4523 7402      HLT
4524 7402      HLT

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4525 1136      TAD PNTCNT
4526 1133      TAD M21
4527 7440      SZA          /CHECK COUNTER
4530 7402      HLT          /JMP COUNTER WRONG
4531 1136      TAD PNTCNT
4532 7001      IAC          /ADVANCE COUNTER
4533 3136      DCA PNTCNT

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4534 5345      /JUMP TEST 18  COUNTER=22
4535 7402      JMP .+11
4536 7402      HLT          /JMP FAILED
4537 7402      HLT          /
4540 7402      HLT          /
4541 7402      HLT          /
4542 7402      HLT          /
4543 7402      HLT          /
4544 7402      HLT          /
4545 1136      TAD PNTCNT
4546 1134      TAD M22
4547 7440      SZA          /CHECK COUNTER
4548 7402      HLT          /JMP COUNTER WRONG
4551 1136      TAD PNTCNT
4552 7001      IAC          /ADVANCE COUNTER
4553 3136      DCA PNTCNT

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/JMP TEST 19 COUNTER=23

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4554 5366      JMP .+12
4555 7402      HLT          /JMP FAILED
4556 7402      HLT          /
4557 7402      HLT          /
4558 7402      HLT          /
4561 7402      HLT          /
4562 7402      HLT          /
4563 7402      HLT          /
4564 7402      HLT          /
4565 7402      HLT          /
4566 1136      TAD PNTCNT
4567 1135      TAD M23
4570 7440      SZA          /CHECK COUNTER
4571 7402      HLT          /JMP COUNTER WRONG
4572 1136      TAD PNTCNT
4573 7001      IAC          /ADVANCE COUNTER
4574 3136      DCA PNTCNT
4575 7000      NOP
4576 7000      NOP
4577 7000      NOP

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4600 1205      /JMP TEST 20  COUNTER=24
4601 3405      TAD PK1
4602 1206      DCA I K7777
4603 3422      TAD PK2
4604 5405      DCA I K0
4605 5422      JMP I K7777
4606 5406      JMP I K0
4606 5406      JMP I K4620

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4620 4620      *4620
4620 1136      TAD PNTCNT
4621 1236      TAD M24
4622 7440      SZA          /CHECK COUNTER
4623 7402      HLT          /JMP COUNTER WRONG
4624 1136      TAD PNTCNT
4625 7001      IAC          /ADVANCE COUNTER
4626 3136      DCA PNTCNT

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4627 1234      /JMP TEST 21  COUNTER=25
4630 3454      TAD PK3
4631 1235      DCA I K7776
4632 3423      TAD PK4
4633 5454      DCA I K1
4634 5423      JMP I K7776
4635 5457      JMP I K1
4636 7754      PK3,      JMP I K4640
              PK4,
              M24,      -24

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4640 4640      *4640
4640 1136      TAD PNTCNT
4641 1256      TAD M25
4642 7440      SZA          /CHECK COUNTER
4643 7402      HLT          /JMP COUNTER WRONG

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4644 1136      TAD PNTCNT
4645 7001      IAC          /ADVANCE COUNTER
4646 3136      DCA PNTCNT

                /JMP TEST 22  COUNTER=26
4647 1254      TAD PK5
4650 3453      DCA I K7775
4651 1255      TAD PK6
4652 3424      DCA I K2
4653 5453      JMP I K7775
4654 5424      PK5,      JMP I K2
4655 5660      PK6,      JMP I 4660
4656 7753      M25,      -25

                *4660
4660 1136      TAD PNTCNT
4661 1276      TAD M26
4662 7440      SZA          /CHECK COUNTER
4663 7402      HLT          /JMP COUNTER WRONG
4664 1136      TAD PNTCNT
4665 7001      IAC          /ADVANCE COUNTER
4666 3136      DCA PNTCNT

                /JMP TEST 23  COUNTER=27
4667 1274      TAD PK7
4670 3452      DCA I K7773
4671 1275      TAD PK8
4672 3425      DCA I K4
4673 5452      JMP I K7773
4674 5425      PK7,      JMP I K4
4675 5461      PK8,      JMP I K4700
4676 7752      M26,      -26

                *4700
4700 1136      TAD PNTCNT
4701 1316      TAD M27
4702 7440      SZA          /CHECK COUNTER
4703 7402      HLT          /JMP COUNTER WRONG
4704 1136      TAD PNTCNT
4705 7001      IAC          /ADVANCE COUNTER
4706 3136      DCA PNTCNT

                /JMP TEST 24  COUNTER=30
4707 1314      TAD PK9
4710 3451      DCA I K7767
4711 1315      TAD PK10
4712 3426      DCA I K10
4713 5451      JMP I K7767
4714 5426      PK9,      JMP I K10
4715 5462      PK10,     JMP I K4720
4716 7751      M27,      -27

                *4720
4720 1136      TAD PNTCNT

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4721 1336      TAD M30
4722 7440      SZA          /CHECK COUNTER
4723 7402      HLT          /JMP COUNTER WRONG
4724 1136      TAD PNTCNT
4725 7001      IAC          /ADVANCE COUNTER
4726 3136      DCA PNTCNT

                /JMP TEST 25  COUNTER=31
4727 1334      TAD PK11
4730 3450      DCA I K7757
4731 1335      TAD PK12
4732 3427      DCA I K20
4733 5450      JMP I K7757
4734 5427      PK11,     JMP I K20
4735 5463      PK12,     JMP I K4740
4736 7750      M30,      -30

                *4740
4740 1136      TAD PNTCNT
4741 1356      TAD M31
4742 7440      SZA          /CHECK COUNTER
4743 7402      HLT          /JMP COUNTER WRONG
4744 1136      TAD PNTCNT
4745 7001      IAC          /ADVANCE COUNTER
4746 3136      DCA PNTCNT

                /JMP TEST 26  COUNTER=32
4747 1354      TAD PK13
4750 3447      DCA I K7737
4751 1355      TAD PK14
4752 3430      DCA I K40
4753 5447      JMP I K7737
4754 5430      PK13,     JMP I K40
4755 5464      PK14,     JMP I K4760
4756 7747      M31,      -31

                *4760
4760 1136      TAD PNTCNT
4761 1376      TAD M32
4762 7440      SZA          /CHECK COUNTER
4763 7402      HLT          /JMP COUNTER WRONG
4764 1136      TAD PNTCNT
4765 7001      IAC          /ADVANCE COUNTER
4766 3136      DCA PNTCNT

                /JMP TEST 27  COUNTER=33
4767 1374      TAD PK15
4770 3446      DCA I K7677
4771 1375      TAD PK16
4772 3431      DCA I K100
4773 5446      JMP I K7677
4774 5431      PK15,     JMP I K100
4775 5465      PK16,     JMP I K5000
4776 7746      M32,      -32

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5000	5000	*5000		
5000	1136		TAD PNTCNT	
5001	1216		TAD M33	
5002	7440		S2A	/CHECK COUNTER
5003	7402		HLT	/JMP COUNTER WRONG
5004	1136		TAD PNTCNT	
5005	7001		IAC	/ADVANCE COUNTER
5006	3136		DCA PNTCNT	

/JMP TEST 28 COUNTER=34				
5007	1214		TAD PK17	
5010	3445		DCA I K7577	
5011	1215		TAD PK18	
5012	3432		DCA I K2000	
5013	3445		JMP I K7577	
5014	3432	PK17,	JMP I K2000	
5015	3446	PK18,	JMP I K5020	
5016	7745	M33,	-33	

5020	5020	*5020		
5020	1136		TAD PNTCNT	
5021	1236		TAD M34	
5022	7440		S2A	/CHECK COUNTER
5023	7402		HLT	/JMP COUNTER WRONG
5024	1136		TAD PNTCNT	
5025	7001		IAC	/ADVANCE COUNTER
5026	3136		DCA PNTCNT	

/JMP TEST 29 COUNTER=35				
5027	1234		TAD PK19	
5030	3444		DCA I K7377	
5031	1235		TAD PK20	
5032	3433		DCA I K4000	
5033	3444		JMP I K7377	
5034	3433	PK19,	JMP I K4000	
5035	3447	PK20,	JMP I K5040	
5036	7744	M34,	-34	

5040	5040	*5040		
5040	1136		TAD PNTCNT	
5041	1256		TAD M35	
5042	7440		S2A	/CHECK COUNTER
5043	7402		HLT	/JMP COUNTER WRONG
5044	1136		TAD PNTCNT	
5045	7001		IAC	/ADVANCE COUNTER
5046	3136		DCA PNTCNT	

/JMP TEST 30 COUNTER=36				
5047	1254		TAD PK21	
5050	3443		DCA I K6777	
5051	1255		TAD PK22	
5052	3434		DCA I K1000	

5053	3443		JMP I K6777	
5054	3434	PK21,	JMP I K1000	
5055	3470	PK22,	JMP I K5060	
5056	7743	M35,	-35	

5060	5060	*5060		
5060	1136		TAD PNTCNT	
5061	1276		TAD M36	
5062	7440		S2A	/CHECK COUNTER
5063	7402		HLT	/JMP COUNTER WRONG
5064	1136		TAD PNTCNT	
5065	7001		IAC	/ADVANCE COUNTER
5066	3136		DCA PNTCNT	

/JMP TEST 31 COUNTER=37				
5067	1274		TAD PK23	
5070	3442		DCA I K5777	
5071	1275		TAD PK24	
5072	3435		DCA I K2000	
5073	3442		JMP I K5777	
5074	3435	PK23,	JMP I K2000	
5075	3471	PK24,	JMP I K5100	
5076	7742	M36,	-36	

5100	5100	*5100		
5100	1136		TAD PNTCNT	
5101	1316		TAD M37	
5102	7440		S2A	/CHECK COUNTER
5103	7402		HLT	/JMP COUNTER WRONG
5104	1136		TAD PNTCNT	
5105	7001		IAC	/ADVANCE COUNTER
5106	3136		DCA PNTCNT	

/JMP TEST 32 COUNTER=40				
5107	1314		TAD PK25	
5110	3437		DCA I K3777	
5111	1315		TAD PK26	
5112	3436		DCA I K4000	
5113	3437		JMP I K3777	
5114	3436	PK25,	JMP I K4000	
5115	3472	PK26,	JMP I K5120	
5116	7741	M37,	-37	

5120	5120	*5120		
5120	1136		TAD PNTCNT	
5121	1336		TAD M40	
5122	7440		S2A	/CHECK COUNTER
5123	7402		HLT	/JMP COUNTER WRONG
5124	1136		TAD PNTCNT	
5125	7001		IAC	/ADVANCE COUNTER
5126	3136		DCA PNTCNT	

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5127 1334      /JMP TEST 33  COUNTER=41
5130 3422      TAD PK27
5131 1335      DCA I K0
5132 3425      TAD PK28
5133 5422      DCA I K7777
5134 5425      JMP I K0
5135 5473      PK27,  JMP I K7777
5136 7740      PK28,  JMP I K5140
              M40,   -40

              5140      *5140
5140 1136      TAD PNTCNT
5141 1336      TAD M41
5142 7440      SZA           /CHECK COUNTER
5143 7402      HLT           /JMP COUNTER WRONG
5144 1136      TAD PNTCNT
5145 7001      IAC           /ADVANCE COUNTER
5146 3136      DCA PNTCNT

              /JMP TEST 34  COUNTER=42
5147 1354      TAD PK29
5150 3423      DCA I K1
5151 1355      TAD PK30
5152 3424      DCA I K7776
5153 5423      JMP I K1
5154 5424      PK29,  JMP I K7776
5155 5474      PK30,  JMP I K5160
5156 7737      M41,   -41

              5160      *5160
5160 1136      TAD PNTCNT
5161 1376      TAD M42
5162 7440      SZA           /CHECK COUNTER
5163 7402      HLT           /JMP COUNTER WRONG
5164 1136      TAD PNTCNT
5165 7001      IAC           /ADVANCE COUNTER
5166 3136      DCA PNTCNT

              /JMP TEST 35  COUNTER=43
5167 1374      TAD PK31
5170 3424      DCA I K2
5171 1375      TAD PK32
5172 3423      DCA I K7775
5173 5424      JMP I K2
5174 5423      PK31,  JMP I K7775
5175 5475      PK32,  JMP I K5200
5176 7736      M42,   -42

              5200      *5200
5200 1136      TAD PNTCNT
5201 1216      TAD M43
5202 7440      SZA           /CHECK COUNTER
5203 7402      HLT           /JMP COUNTER WRONG
5204 1136      TAD PNTCNT

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5205 7001      IAC           /ADVANCE COUNTER
5206 3136      DCA PNTCNT

              /JMP TEST 36  COUNTER=44
5207 1214      TAD PK33
5210 3425      DCA I K4
5211 1215      TAD PK34
5212 3422      DCA I K7773
5213 5425      JMP I K4
5214 5422      PK33,  JMP I K7773
5215 5476      PK34,  JMP I K5220
5216 7735      M43,   -43

              5220      *5220
5220 1136      TAD PNTCNT
5221 1236      TAD M44
5222 7440      SZA           /CHECK COUNTER
5223 7402      HLT           /JMP COUNTER WRONG
5224 1136      TAD PNTCNT
5225 7001      IAC           /ADVANCE COUNTER
5226 3136      DCA PNTCNT

              /JMP TEST 37  COUNTER=45
5227 1234      TAD PK35
5230 3426      DCA I K10
5231 1235      TAD PK36
5232 3421      DCA I K7767
5233 5426      JMP I K10
5234 5421      PK35,  JMP I K7767
5235 5502      PK36,  JMP I K5240
5236 7734      M44,   -44

              5240      *5240
5240 1136      TAD PNTCNT
5241 1256      TAD M45
5242 7440      SZA           /CHECK COUNTER
5243 7402      HLT           /JMP COUNTER WRONG
5244 1136      TAD PNTCNT
5245 7001      IAC           /ADVANCE COUNTER
5246 3136      DCA PNTCNT

              /JMP TEST 3  COUNTER=46
5247 1254      TAD PK37
5250 3427      DCA I K20
5251 1255      TAD PK38
5252 3420      DCA I K7757
5253 5427      JMP I K20
5254 5420      PK37,  JMP I K7757
5255 5503      PK38,  JMP I K5260
5256 7733      M45,   -45

              5260      *5260
5260 1136      TAD PNTCNT
5261 1276      TAD M46

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5262	7440	SEA	/CHECK COUNTER
5263	7402	-LT	/JMP COUNTER WRONG
5264	1136	TAD PNTCNT	
5265	7001	IAC	/ADVANCE COUNTER
5266	3136	DCA PNTCNT	
/JMP TEST 39 COUNTER=47			
5267	1274	TAD PK39	
5270	3430	DCA I K40	
5271	1275	TAD PK40	
5272	3447	DCA I K7737	
5273	5430	JMP I K40	
5274	5447	JMP I K7737	
5275	5504	JMP I K5300	
5276	7732	M46, -46	
*5300			
5300	1136	TAD PNTCNT	
5301	1316	TAD M47	
5302	7440	SEA	/CHECK COUNTER
5303	7402	HLT	/JMP COUNTER WRONG
5304	1136	TAD PNTCNT	
5305	7001	IAC	/ADVANCE COUNTER
5306	3136	DCA PNTCNT	
/JMP TEST 40 COUNTER=50			
5307	1314	TAD PK41	
5310	3431	DCA I K100	
5311	1315	TAD PK42	
5312	3446	DCA I K7677	
5313	5431	JMP I K100	
5314	5446	JMP I K7677	
5315	5505	JMP I K5320	
5316	7731	M47, -47	

*5320			
5320	1136	TAD PNTCNT	
5321	1336	TAD M50	
5322	7440	SEA	/CHECK COUNTER
5323	7402	HLT	/JMP COUNTER WRONG
5324	1136	TAD PNTCNT	
5325	7001	IAC	/ADVANCE COUNTER
5326	3136	DCA PNTCNT	
/JMP TEST 41 COUNTER=51			
5327	1334	TAD PK43	
5330	3432	DCA I K200	
5331	1335	TAD PK44	
5332	3445	DCA I K7577	
5333	5432	JMP I K200	
5334	5445	JMP I K7577	
5335	5506	JMP I K5340	
5336	7730	M50, -50	

*5340			
5340	1136	TAD PNTCNT	
5341	1336	TAD M51	
5342	7440	SEA	/CHECK COUNTER
5343	7402	HLT	/JMP COUNTER WRONG
5344	1136	TAD PNTCNT	
5345	7001	IAC	/ADVANCE COUNTER
5346	3136	DCA PNTCNT	
/JMP TEST 42 COUNTER=52			
5347	1334	TAD PK45	
5350	3433	DCA I K400	
5351	1335	TAD PK46	
5352	3444	DCA I K7577	
5353	5433	JMP I K400	
5354	5444	JMP I K7577	
5355	5507	JMP I K5360	
5356	7727	M51, -51	
*5360			
5360	1136	TAD PNTCNT	
5361	1376	TAD M52	
5362	7440	SEA	/CHECK COUNTER
5363	7402	HLT	/JMP COUNTER WRONG
5364	1136	TAD PNTCNT	
5365	7001	IAC	/ADVANCE COUNTER
5366	3136	DCA PNTCNT	
/JMP TEST 43 COUNTER=53			
5367	1374	TAD PK47	
5370	3434	DCA I K1000	
5371	1375	TAD PK48	
5372	3443	DCA I K6777	
5373	5434	JMP I K1000	
5374	5443	JMP I K6777	
5375	5510	JMP I K5400	
5376	7726	M52, -52	
*5400			
5400	1136	TAD PNTCNT	
5401	1216	TAD M53	
5402	7440	SEA	/CHECK COUNTER
5403	7402	HLT	/JMP COUNTER WRONG
5404	1136	TAD PNTCNT	
5405	7001	IAC	/ADVANCE COUNTER
5406	3136	DCA PNTCNT	
/JMP TEST 44 COUNTER=54			
5407	1214	TAD PK49	
5410	3435	DCA I K2000	
5411	1215	TAD PK50	
5412	3442	DCA I K5777	
5413	5435	JMP I K2000	
5414	5442	JMP I K5777	

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5415 5511 PK50, JMP I K5420
5416 7725 M53, -53

5420 *5420
5420 1136 TAD PNTCNT
5421 1236 TAD M54
5422 7440 SEA /CHECK COUNTER
5423 7402 HLT /JMP COUNTER WRONG
5424 1136 TAD PNTCNT
5425 7001 IAC /ADVANCE COUNTER
5426 3136 DCA PNTCNT

/JMP TEST 45 COUNTER=55
5427 1234 TAD PK51
5430 3436 OCA I K4000
5431 1235 TAD PK52
5432 3437 OCA I K3777
5433 3436 JMP I K4000
5434 3437 PK51, JMP I K3777
5435 5512 PK52, JMP I K5440
5436 7724 M54, -54

5440 *5440
5440 1136 TAD PNTCNT
5441 1250 TAD M55
5442 7440 SEA /CHECK COUNTER
5443 7402 HLT /JMP COUNTER WRONG
5444 1136 TAD PNTCNT
5445 7001 IAC /ADVANCE COUNTER
5446 3136 DCA PNTCNT

/JMS TEST 1 COUNTER=56
5447 5051 JMP I AFRM
5450 7723 M55, -55
5451 2002 AFRM, FRM

2002 *2002
2002 4203 JMS TO
2003 5203 TO, JMP
2004 1136 TAD PNTCNT
2005 1222 TAD M56
2006 7440 SEA /CHECK COUNTER
2007 7402 HLT /JMP COUNTER WRONG
2010 1224 TAD AFRM
2011 7041 CIA
2012 1203 TAD TO
2013 7440 SEA /CHECK STORED ADDRESS
2014 7402 HLT /JMS FAILED
2015 3203 OCA TO /CLEAR STORED PC
2016 1136 TAD PNTCNT
2017 7001 IAC
2020 3136 OCA PNTCNT
2021 7410 SKP
2022 7722 M56, -56

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2023 7410 SKP
2024 2003 AFRM, FRM+1

/JMS TEST 2 COUNTER=57
2025 4227 JMS TO1
2026 7402 FRM1, HLT
2027 5227 TO1, JMP
2030 1136 TAD PNTCNT
2031 1246 TAD M57
2032 7440 SEA /CHECK COUNTER
2033 7402 HLT /JMP COUNTER WRONG
2034 1250 TAD AFRM1
2035 7041 CIA
2036 1227 TAD TO1
2037 7440 SEA /CHECK STORED ADDRESS
2040 7402 HLT /JMS FAILED
2041 3227 OCA TO1 /CLEAR STORED PC
2042 1136 TAD PNTCNT
2043 7001 IAC
2044 3136 DCA PNTCNT
2045 7410 SKP

2046 7721 M57, -57
2047 7410 SKP
2050 2026 AFRM1, FRM1

/JMS TEST 3 COUNTER=60
2051 4254 JMS TO2
2052 7402 FRM2, HLT
2053 7402 HLT
2054 5254 TO2, JMP
2055 1136 TAD PNTCNT
2056 1275 TAD M60
2057 7440 SEA /CHECK COUNTER
2060 7402 HLT /JMP COUNTER WRONG
2061 1273 TAD AFRM2
2062 7041 CIA
2063 1254 TAD TO2
2064 7440 SEA /CHECK STORED ADDRESS
2065 7402 HLT /JMS FAILED
2066 3254 OCA TO2 /CLEAR STORED PC
2067 1136 TAD PNTCNT
2070 7001 IAC
2071 3136 DCA PNTCNT
2072 7410 SKP
2073 2052 AFRM2, FRM2
2074 7410 SKP
2075 7720 M60, -60

/JMS TEST 4 COUNTER=61
2076 4302 JMS TO3
2077 7402 FRM3, HLT
2100 7402 HLT
2101 7402 HLT

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2102 5302 T03, JMP .
2103 1136 TAD PNTCNT
2104 1323 TAD M61
2105 7440 SEA /CHECK COUNTER
2106 7402 HLT /JMP COUNTER WRONG
2107 1321 TAD AFRM3
2110 7041 CIA
2111 1302 TAD T03
2112 7440 SEA /CHECK STORED ADDRESS
2113 7402 HLT /JMS FAILED
2114 3302 DCA T03 /CLEAR STORED PC
2115 1136 TAD PNTCNT
2116 7001 IAC
2117 3136 DCA PNTCNT
2120 7410 SKP
2121 2077 AFRM3, FRM3
2122 7410 SKP
2123 7717 M61, -61

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2124 4330 /JMS TEST 5 COUNTER=62
2125 7402 JMS T04
2126 7402 FRM4, HLT
2127 7402 HLT
2130 9330 T04, JMP .
2131 1136 TAD PNTCNT
2132 1391 TAD M62
2133 7440 SEA /CHECK COUNTER
2134 7402 HLT /JMP COUNTER WRONG
2135 1347 TAD AFRM4
2136 7041 CIA
2137 1330 TAD T04
2140 7440 SEA /CHECK STORED ADDRESS
2141 7402 HLT /JMS FAILED
2142 3330 DCA T04 /CLEAR STORED PC
2143 1136 TAD PNTCNT
2144 7001 IAC
2145 3136 DCA PNTCNT
2146 7410 SKP
2147 2125 AFRM4, FRM4
2150 7410 SKP
2151 7716 M62, -62

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2152 4396 /JMS TEST 6 COUNTER=63
2153 7402 JMS T05
2154 7402 FRM5, HLT
2155 7402 HLT
2156 9396 T05, JMP .
2157 1136 TAD PNTCNT
2160 1377 TAD M63
2161 7440 SEA /CHECK COUNTER

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2162 7402 HLT /JMP COUNTER WRONG
2163 1375 TAD AFRM5
2164 7041 CIA
2165 1396 TAD T05
2166 7440 SEA /CHECK STORED ADDRESS
2167 7402 HLT /JMS FAILED
2170 3396 DCA T05 /CLEAR STORED PC
2171 1136 TAD PNTCNT
2172 7001 IAC
2173 3136 DCA PNTCNT
2174 7410 SKP
2175 2193 AFRM5, FRM5
2176 7410 SKP
2177 7715 M63, -63

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PAUSE

/TAPE # 2
2200 *2200

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2200 7000 /JMS TEST 7 COUNTER=64
2201 4202 NOP
2202 9202 JMS T06
2203 1136 T06, JMP .
2204 1221 TAD PNTCNT
2205 7440 TAD M64
2206 7402 SEA /CHECK COUNTER
2207 1202 HLT /JMP COUNTER WRONG
2210 7041 TAD T06
2211 1223 CIA
2212 7440 TAD AT06
2213 7402 SEA /CHECK STORED ADDRESS
2214 3202 HLT /JMS FAILED
2215 1136 DCA T06 /CLEAR STORED PC
2216 7001 TAD PNTCNT
2217 3136 IAC
2220 7410 DCA PNTCNT
2221 7714 M64, -64
2222 7410 SKP
2223 2202 AT06, T06

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2224 4226 /JMS TEST 8 COUNTER=65
2225 7402 JMS T07
2226 9226 FRM7, HLT
2227 1136 T07, JMP .
2230 1245 TAD PNTCNT
2231 7440 TAD M65
2232 7402 SEA /CHECK COUNTER
2233 1247 HLT /JMP COUNTER WRONG
2234 7041 TAD AFRM7
2235 1226 CIA
TAD T07

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2236 7440      SZA      /CHECK STORED ADDRESS
2237 7402      HLT      /JMS FAILED
2240 3226      DCA T07   /CLEAR STORED PC
2241 1136      TAD PNTCNT
2242 7001      IAC
2243 3136      DCA PNTCNT
2244 7410      SKP
2245 7713      M65,     -65
2246 7410      SKP
2247 2225      AFRM7,   FRM7

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                /JMS TEST 9 COUNTER=66
2250 4253      JMS T08
2251 7402      FRM8,    HLT
2252 7402      HLT
2253 5253      T08,     JMP .
2254 1136      TAD PNTCNT
2255 1274      TAD M66
2256 7440      SZA      /CHECK COUNTER
2257 7402      HLT      /JMP COUNTER WRONG
2260 1253      TAD T08
2261 7041      CIA
2262 1272      TAD AFRM8
2263 7440      SZA      /CHECK STORED ADDRESS
2264 7402      HLT      /JMS FAILED
2265 3253      DCA T08   /CLEAR STORED PC
2266 1136      TAD PNTCNT
2267 7001      IAC
2270 3136      DCA PNTCNT
2271 7410      SKP
2272 2251      AFRM8,   FRM8
2273 7410      SKP
2274 7712      M66,     -66

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                /JMS TEST 10 COUNTER=67
2275 4301      JMS T09
2276 7402      FRM9,    HLT
2277 7402      HLT
2280 7402      HLT
2281 5301      T09,     JMP .
2282 1136      TAD PNTCNT
2283 1322      TAD M67
2284 7440      SZA      /CHECK COUNTER
2285 7402      HLT      /JMP COUNTER WRONG
2286 1301      TAD T09
2287 7041      CIA
2288 1320      TAD AFRM9
2289 7440      SZA      /CHECK STORED ADDRESS
2290 7402      HLT      /JMS FAILED
2291 3301      DCA T09   /CLEAR STORED PC
2292 1136      TAD PNTCNT
2293 7001      IAC
2294 3136      DCA PNTCNT
2295 7410      SKP

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2320 2276      AFRM9,   FRM9
2321 7410      SKP
2322 7711      M67,     -67

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                /JMS TEST 11 COUNTER =70
2323 4330      JMS T010
2324 7402      FRM10,   HLT
2325 7402      HLT
2326 7402      HLT
2327 7402      HLT

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2330 5330      T010,    JMP .
2331 1136      TAD PNTCNT
2332 1351      TAD M70
2333 7440      SZA      /CHECK COUNTER
2334 7402      HLT      /JMP COUNTER WRONG
2335 1330      TAD T010
2336 7041      CIA
2337 1347      TAD AFRM10
2338 7440      SZA      /CHECK STORED ADDRESS
2339 7402      HLT      /JMS FAILED
2340 3330      DCA T010   /CLEAR STORED PC
2341 1136      TAD PNTCNT
2342 7001      IAC
2343 3136      DCA PNTCNT
2344 7410      SKP
2345 2324      AFRM10,   FRM10
2346 7410      SKP
2347 7710      M70,     -70

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                /JMS TEST 11 COUNTER=71
2352 4356      JMS T011
2353 7402      FRM11,   HLT
2354 7402      HLT
2355 7402      HLT
2356 5356      T011,    JMP .
2357 1136      TAD PNTCNT
2358 1377      TAD M71
2359 7440      SZA      /CHECK COUNTER
2360 7402      HLT      /JMP COUNTER WRONG
2361 1356      TAD T011
2362 7041      CIA
2363 1375      TAD AFRM11
2364 7440      SZA      /CHECK STORED ADDRESS
2365 7402      HLT      /JMS FAILED
2366 3356      DCA T011   /CLEAR STORED PC
2367 1136      TAD PNTCNT
2368 7001      IAC
2369 3136      DCA PNTCNT
2370 7410      SKP
2371 2353      AFRM11,   FRM11
2372 7410      SKP
2373 7727      M71,     -71

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2400      *2400
          /JMS TEST 12  COUNTER=72
2400 1205      TAD RK1
2401 3455      DCA I K7777
2402 1206      TAD RK2
2403 3423      DCA I K1
2404 3423      JMP I K1
2405 3537      RK1,  JMP I K2410
2406 4434      RK2,  JMS I K7776

          2410      *2410
2410 1136      TAD PNTCNT
2411 1233      TAD M72
2412 7440      SEA      /CHECK COUNTER
2413 7402      HLT      /JMP COUNTER WRONG
2414 1494      TAD I K7776
2415 1054      TAD K7776
2416 7440      SEA      /CHECK STORED ADDRESS
2417 7402      HLT      /JMS FAILED
2420 3454      DCA I K7776  /CLEAR STORED ADDRESS
2421 1136      TAD PNTCNT
2422 7001      IAC      /ADVANCE COUNTER
2423 3136      DCA PNTCNT

          /JMS TEST 13  COUNTER=73
2424 1231      TAD RK3
2425 3454      DCA I K7776
2426 1232      TAD RK4
2427 3424      DCA I K2
2430 3424      JMP I K2
2431 3540      RK3,  JMP I K2440
2432 4453      RK4,  JMS I K7775
2433 7706      M72,  -72

          2440      *2440
2440 1136      TAD PNTCNT
2441 1263      TAD M73
2442 7440      SEA      /CHECK COUNTER
2443 7402      HLT      /JMP COUNTER WRONG
2444 1493      TAD I K7775
2445 1053      TAD K7775
2446 7440      SEA      /CHECK STORED ADDRESS
2447 7402      HLT      /JMS FAILED
2450 3493      DCA I K7775  /CLEAR STORED ADDRESS
2451 1136      TAD PNTCNT
2452 7001      IAC      /ADVANCE COUNTER
2453 3136      DCA PNTCNT

          /JMS TEST 14  COUNTER=74
2454 1261      TAD RK5

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2455 3664      DCA I K7774
2456 1262      TAD RK6
2457 3425      DCA I K4
2460 3425      JMP I K4
2461 3541      RK5,  JMP I K2470
2462 4452      RK6,  JMS I K7773
2463 7705      M73,  -73
2464 7774      K7774, 7774

          2470      *2470
2470 1136      TAD PNTCNT
2471 1313      TAD M74
2472 7440      SEA      /CHECK COUNTER
2473 7402      HLT      /JMP COUNTER WRONG
2474 1492      TAD I K7773
2475 1092      TAD K7773
2476 7440      SEA      /CHECK STORED ADDRESS
2477 7402      HLT      /JMS FAILED
2500 3492      DCA I K7773  /CLEAR STORED ADDRESS
2501 1136      TAD PNTCNT
2502 7001      IAC      /ADVANCE COUNTER
2503 3136      DCA PNTCNT

          /JMS TEST 15  COUNTER=75
2504 1311      TAD RK7
2505 3714      DCA I K7770
2506 1312      TAD RK8
2507 3426      DCA I K10
2510 3426      JMP I K10
2511 3542      RK7,  JMP I K2520
2512 4451      RK8,  JMS I K7767
2513 7704      M74,  -74
2514 7770      K7770, 7770

          2520      *2520
2520 1136      TAD PNTCNT
2521 1343      TAD M75
2522 7440      SEA      /CHECK COUNTER
2523 7402      HLT      /JMP COUNTER WRONG
2524 1491      TAD I K7767
2525 1051      TAD K7767
2526 7440      SEA      /CHECK STORED ADDRESS
2527 7402      HLT      /JMS FAILED
2530 3491      DCA I K7767  /CLEAR STORED ADDRESS
2531 1136      TAD PNTCNT
2532 7001      IAC      /ADVANCE COUNTER
2533 3136      DCA PNTCNT

          /JMS TEST 16  COUNTER=76
2534 1341      TAD RK9
2535 3744      DCA I K7760
2536 1342      TAD RK10
2537 3427      DCA I K20
2540 3427      JMP I K20

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2541 5543 RK9, JMP I K2600
2542 4450 RK10, JMS I K7757
2543 7703 M75, -75
2544 7760 K7760, 7760

2600 2600 *2600
2600 1136 TAD PNTCNT
2601 1223 TAD M76
2602 7440 SZA /CHECK COUNTER
2603 7402 HLT /JMP COUNTER WRONG
2604 1450 TAD I K7757
2605 1050 TAD K7757
2606 7440 SZA /CHECK STORED ADDRESS
2607 7402 HLT /JMS FAILED
2610 3450 DCA I K7757 /CLEAR STORED ADDRESS
2611 1136 TAD PNTCNT
2612 7001 IAC /ADVANCE COUNTER
2613 3136 DCA PNTCNT

/JMS TEST 17 COUNTER=77
2614 1221 TAD RK11
2615 3624 DCA I K7740
2616 1222 TAD RK12
2617 3430 DCA I K40
2620 5430 JMP I K40
2621 5544 RK11, JMP I K2630
2622 4447 RK12, JMS I K7737
2623 7702 M76, -76
2624 7740 K7740, 7740

2630 2630 *2630
2630 1136 TAD PNTCNT
2631 1253 TAD M77
2632 7440 SZA /CHECK COUNTER
2633 7402 HLT /JMP COUNTER WRONG
2634 1447 TAD I K7737
2635 1047 TAD K7737
2636 7440 SZA /CHECK STORED ADDRESS
2637 7402 HLT /JMS FAILED
2640 3447 DCA I K7737 /CLEAR STORED ADDRESS
2641 1136 TAD PNTCNT
2642 7001 IAC /ADVANCE COUNTER
2643 3136 DCA PNTCNT

/JMS TEST 18 COUNTER=100
2644 1251 TAD RK13
2645 3054 DCA I K7700
2646 1252 TAD RK14
2647 3431 DCA I K100
2650 5431 JMP I K100
2651 5545 RK13, JMP I K2660
2652 4446 RK14, JMS I K7677
2653 7701 M77, -77
2654 7700 K7700, 7700

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2660 2660 *2660
2660 1136 TAD PNTCNT
2661 1303 TAD M100
2662 7440 SZA /CHECK COUNTER
2663 7402 HLT /JMS COUNTER WRONG
2664 1446 TAD I K7677
2665 1046 TAD K7677
2666 7440 SZA /CHECK STORED ADDRESS
2667 7402 HLT /JMS FAILED
2670 3446 DCA I K7677 /CLEAR STORED ADDRESS
2671 1136 TAD PNTCNT
2672 7001 IAC /ADVANCE COUNTER
2673 3136 DCA PNTCNT

/JMS TEST 19 COUNTER=101
2674 1301 TAD RK15
2675 3704 DCA I K7600
2676 1302 TAD RK16
2677 3432 DCA I K200
2700 5432 JMP I K200
2701 5546 RK15, JMP I K2710
2702 4445 RK16, JMS I K7577
2703 7700 M100, -100
2704 7600 K7600, 7600

2710 2710 *2710
2710 1136 TAD PNTCNT
2711 1333 TAD M101
2712 7440 SZA /CHECK COUNTER
2713 7402 HLT /JMP COUNTER WRONG
2714 1445 TAD I K7577
2715 1045 TAD K7577
2716 7440 SZA /CHECK STORED ADDRESS
2717 7402 HLT /JMS FAILED
2720 3445 DCA I K7577 /CLEAR STORED ADDRESS
2721 1136 TAD PNTCNT
2722 7001 IAC /ADVANCE COUNTER
2723 3136 DCA PNTCNT

/JMS TEST 20 COUNTER=102
2724 1331 TAD RK17
2725 3734 DCA I K7400
2726 1332 TAD RK18
2727 3433 DCA I K400
2730 5433 JMP I K400
2731 5547 RK17, JMP I K2740
2732 4444 RK18, JMS I K7377
2733 7677 M101, -101
2734 7400 K7400, 7400

2740 2740 *2740
2740 1136 TAD PNTCNT

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2741	1363	TAD M102	
2742	7442	SEA	/CHECK COUNTER
2743	7402	HLT	/JMP COUNTER WRONG
2744	1444	TAD I K7377	
2745	1044	TAD K7377	
2746	7440	SEA	/CHECK STORED ADDRESS
2747	7402	HLT	/JMS FAILED
2750	3444	DCA I K7377	/CLEAR STORED ADDRESS
2751	1136	TAD PNTCNT	
2752	7001	IAC	/ADVANCE COUNTER
2753	3136	DCA PNTCNT	

/JMS TEST 21 COUNTER=103			
2754	1361	TAD RK19	
2755	3764	DCA I K7000	
2756	1362	TAD RK20	
2757	3434	DCA I K1000	
2760	5434	JMP I K1000	
2761	5550	JMP I K3000	
2762	4443	JMS I K6777	
2763	7676	-102	
2764	7000	K7000,	7000

*3000			
3000	1136	TAD PNTCNT	
3001	1223	TAD M103	
3002	7440	SEA	/CHECK COUNTER
3003	7402	HLT	/JMP COUNTER WRONG
3004	1443	TAD I K6777	
3005	1043	TAD K6777	
3006	7440	SEA	/CHECK STORED ADDRESS
3007	7402	HLT	/JMS FAILED
3010	3443	DCA I K6777	/CLEAR STORED ADDRESS
3011	1136	TAD PNTCNT	
3012	7001	IAC	/ADVANCE COUNTER
3013	3136	DCA PNTCNT	

/JMS TEST 22 COUNTER=104			
3014	1221	TAD RK21	
3015	3624	DCA I K6000	
3016	1222	TAD RK22	
3017	3435	DCA I K2000	
3020	5435	JMP I K2000	
3021	5551	JMP I K3030	
3022	4442	JMS I K9777	
3023	7675	M103,	-103
3024	6000	K6000,	6000

*3030			
3030	1136	TAD PNTCNT	
3031	1253	TAD M104	
3032	7440	SEA	/CHECK COUNTER
3033	7402	HLT	/JMP COUNTER WRONG
3034	1442	TAD I K9777	

3035	1042	TAD K9777	
3036	7440	SEA	/CHECK STORED ADDRESS
3037	7402	HLT	/JMS FAILED
3040	3442	DCA I K9777	/CLEAR STORED ADDRESS
3041	1136	TAD PNTCNT	
3042	7001	IAC	/ADVANCE COUNTER
3043	3136	DCA PNTCNT	

/JMS TEST 23 COUNTER=105			
3044	1251	TAD RK23	
3045	3654	DCA I K4001	
3046	1252	TAD RK24	
3047	3437	DCA I K3777	
3050	5437	JMP I K3777	
3051	5552	JMP I K3000	
3052	4436	JMS I K4000	
3053	7674	M104,	-104
3054	4001	K4001,	4001

*3060			
3060	1136	TAD PNTCNT	
3061	1303	TAD M105	
3062	7440	SEA	/CHECK COUNTER
3063	7402	HLT	/JMP COUNTER WRONG
3064	1436	TAD I K4000	
3065	1036	TAD K4000	
3066	7440	SEA	/CHECK STORED ADDRESS
3067	7402	HLT	/JMS FAILED
3070	3436	DCA I K4000	/CLEAR STORED ADDRESS
3071	1136	TAD PNTCNT	
3072	7001	IAC	/ADVANCE COUNTER
3073	3136	DCA PNTCNT	

/JMS TEST 24 COUNTER=106			
3074	1301	TAD RK25	
3075	3704	DCA I K2001	
3076	1302	TAD RK26	
3077	3442	DCA I K9777	
3100	5442	JMP I K9777	
3101	5553	JMP I K3110	
3102	4435	JMS I K2000	
3103	7673	M105,	-105
3104	2001	K2001,	2001

*3110			
3110	1136	TAD PNTCNT	
3111	1333	TAD M106	
3112	7440	SEA	/CHECK COUNTER
3113	7402	HLT	/JMP COUNTER WRONG
3114	1435	TAD I K2000	
3115	1035	TAD K2000	
3116	7440	SEA	/CHECK STORED ADDRESS
3117	7402	HLT	/JMS FAILED
3120	3435	DCA I K2000	/CLEAR STORED ADDRESS

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3121 1136      TAD PNTCNT
3122 7001      IAC      /ADVANCE COUNTER
3123 3136      DCA PNTCNT

      /JMS TEST 25  COUNTER=107
3124 1331      TAD RK27
3125 3734      DCA I K1001
3126 1332      TAD RK28
3127 3443      DCA I K6777
3130 5443      JMP I K6777
3131 5554      RK27,  JMP I K3140
3132 4434      RK28,  JMS I K1000
3133 7672      M106,  -106
3134 1001      K1001, 1001

      *3140
3140 1136      TAD PNTCNT
3141 1363      TAD M107
3142 7440      SZA      /CHECK COUNTER
3143 7402      HLT      /JMP COUNTER WRONG
3144 1434      TAD I K1000
3145 1034      TAD K1000
3146 7440      SZA      /CHECK STORED ADDRESS
3147 7402      HLT      /JMS FAILED
3150 3434      DCA I K1000 /CLEAR STORED ADDRESS
3151 1136      TAD PNTCNT
3152 7001      IAC      /ADVANCE COUNTER
3153 3136      DCA PNTCNT

      /JMS TEST 26  COUNTER=110
3154 1361      TAD RK29
3155 3744      DCA I K401
3156 1302      TAD RK30
3157 3444      DCA I K7377
3160 5444      JMP I K7377
3161 5555      RK29,  JMP I K3200
3162 4433      RK30,  JMS I K400
3163 7671      M107,  -107
3164 0401      K401,  401

      *3200
3200 1136      TAD PNTCNT
3201 1223      TAD M110
3202 7440      SZA      /CHECK COUNTER
3203 7402      HLT      /JMP COUNTER WRONG
3204 1433      TAD I K400
3205 1033      TAD K400
3206 7440      SZA      /CHECK STORED ADDRESS
3207 7402      HLT      /JMS FAILED
3210 3433      DCA I K400 /CLEAR STORED ADDRESS
3211 1136      TAD PNTCNT
3212 7001      IAC      /ADVANCE COUNTER
3213 3136      DCA PNTCNT

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      /JMS TEST 27  COUNTER=111
3214 1221      TAD RK31
3215 3624      DCA I K201
3216 1222      TAD RK32
3217 3445      DCA I K7577
3220 5445      JMP I K7577
3221 5556      RK31,  JMP I K3230
3222 4432      RK32,  JMS I K200
3223 7670      M110,  -110
3224 0201      K201,  201

      *3230
3230 1136      TAD PNTCNT
3231 1253      TAD M111
3232 7440      SZA      /CHECK COUNTER
3233 7402      HLT      /JMP COUNTER WRONG
3234 1432      TAD I K200
3235 1032      TAD K200
3236 7440      SZA      /CHECK STORED ADDRESS
3237 7402      HLT      /JMS FAILED
3240 3432      DCA I K200 /CLEAR STORED ADDRESS
3241 1136      TAD PNTCNT
3242 7001      IAC      /ADVANCE COUNTER
3243 3136      DCA PNTCNT

      /JMS TEST 28  COUNTER =112
3244 1251      TAD RK33
3245 3654      DCA I K101
3246 1252      TAD RK34
3247 3446      DCA I K7677
3250 5446      JMP I K7677
3251 5557      RK33,  JMP I K3260
3252 4431      RK34,  JMS I K100
3253 7667      M111,  -111
3254 0101      K101,  101

      *3260
3260 1136      TAD PNTCNT
3261 1303      TAD M112
3262 7440      SZA      /CHECK COUNTER
3263 7402      HLT      /JMP COUNTER WRONG
3264 1431      TAD I K100
3265 1031      TAD K100
3266 7440      SZA      /CHECK STORED ADDRESS
3267 7402      HLT      /JMS FAILED
3270 3431      DCA I K100 /CLEAR STORED ADDRESS
3271 1136      TAD PNTCNT
3272 7001      IAC      /ADVANCE COUNTER
3273 3136      DCA PNTCNT

      /JMS TEST 29  COUNTER=113
3274 1301      TAD RK35
3275 3704      DCA I K41
3276 1302      TAD RK36

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3277 3447      DCA I K7737
3300 5447      JMP I K7737
3301 5560      RK35, JMP I K3310
3302 4430      RK36, JMS I K40
3303 7666      M112, -112
3304 0041      K41, 41

          3310      *3310
3310 1136      TAD PNTCNT
3311 1333      TAD M113
3312 7440      SZA          /CHECK COUNTER
3313 7402      HLT          /JMP COUNTER WRONG
3314 1430      TAD I K40
3315 1030      TAD K40
3316 7440      SZA          /CHECK STORED ADDRESS
3317 7402      HLT          /JMS FAILED
3320 3430      DCA I K40          /CLEAR STORED ADDRESS
3321 1136      TAD PNTCNT
3322 7001      IAC          /ADVANCE COUNTER
3323 3136      DCA PNTCNT

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          /JMS TEST 30 COUNTER=114
3324 1331      TAD RK37
3325 3734      DCA I K21
3326 1332      TAD RK38
3327 3450      DCA I K7797
3330 5450      JMP I K7797
3331 5561      RK37, JMP I K3340
3332 4427      RK38, JMS I K20
3333 7665      M113, -113
3334 0021      K21, 21

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          3340      *3340
3340 1136      TAD PNTCNT
3341 1363      TAD M114
3342 7440      SZA          /CHECK COUNTER
3343 7402      HLT          /JMP COUNTER WRONG
3344 1427      TAD I K20
3345 1027      TAD K20
3346 7440      SZA          /CHECK STORED ADDRESS
3347 7402      HLT          /JMS FAILED
3350 3427      DCA I K20          /CLEAR STORED ADDRESS
3351 1136      TAD PNTCNT
3352 7001      IAC          /ADVANCE COUNTER
3353 3136      DCA PNTCNT

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          /JMS TEST 31 COUNTER=115
3354 1361      TAD RK39
3355 3764      DCA I K11
3356 1362      TAD RK40
3357 3451      DCA I K7767
3360 5451      JMP I K7767
3361 5562      RK39, JMP I K3400

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3362 4426      RK40, JMS I K10
3363 7664      M114, -114
3364 0011      K11, 11

          3400      *3400
3400 1136      TAD PNTCNT
3401 1223      TAD M115
3402 7440      SZA          /CHECK COUNTER
3403 7402      HLT          /JMP COUNTER WRONG
3404 1426      TAD I K10
3405 1026      TAD K10
3406 7440      SZA          /CHECK STORED ADDRESS
3407 7402      HLT          /JMS FAILED
3410 3426      DCA I K10          /CLEAR STORED ADDRESS
3411 1136      TAD PNTCNT
3412 7001      IAC          /ADVANCE COUNTER
3413 3136      DCA PNTCNT

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          /JMS TEST 32 COUNTER=116
3414 1221      TAD RK41
3415 3624      DCA I K5
3416 1222      TAD RK42
3417 3452      DCA I K7773
3420 5452      JMP I K7773
3421 5563      RK41, JMP I K3430
3422 4425      RK42, JMS I K4
3423 7663      M115, -115
3424 0005      K5, 5

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          3430      *3430
3430 1136      TAD PNTCNT
3431 1253      TAD M116
3432 7440      SZA          /CHECK COUNTER
3433 7402      HLT          /JMP COUNTER WRONG
3434 1425      TAD I K4
3435 1025      TAD K4
3436 7440      SZA          /CHECK STORED ADDRESS
3437 7402      HLT          /JMS FAILED
3440 3425      DCA I K4          /CLEAR STORED ADDRESS
3441 1136      TAD PNTCNT
3442 7001      IAC          /ADVANCE COUNTER
3443 3136      DCA PNTCNT

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          /JMS TEST 33 COUNTER=117
3444 1251      TAD RK43
3445 3654      DCA I K3
3446 1252      TAD RK44
3447 3453      DCA I K7775
3450 5453      JMP I K7775
3451 5564      RK43, JMP I K3460
3452 4424      RK44, JMS I K2
3453 7662      M116, -116
3454 0003      K3, 3

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3460 3460 *3460
3460 1136 TAD PNTCNT
3461 1303 TAD M117
3462 7440 SZA /CHECK COUNTER
3463 7402 HLT /JMP COUNTER WRONG
3464 1424 TAD I K2
3465 1024 TAD K2
3466 7440 SZA /CHECK STORED ADDRESS
3467 7402 HLT /JMS FAILED
3470 3424 DCA I K2 /CLEAR STORED ADDRESS
3471 1136 TAD PNTCNT
3472 7001 IAC /ADVANCE COUNTER
3473 3136 DCA PNTCNT

/JMS TEST 34 COUNTER=120
3474 1301 TAD RK45
3475 3424 DCA I K2
3476 1302 TAD RK46
3477 3454 DCA I K7776
3500 3454 JMP I K7776
3501 5505 RK45, JMP I K3510
3502 4423 RK46, JMS I K1
3503 7661 M117, -117

3510 3510 *3510
3510 1136 TAD PNTCNT
3511 1333 TAD M120
3512 7440 SZA /CHECK COUNTER
3513 7402 HLT /JMP COUNTER WRONG
3514 1423 TAD I K1
3515 1023 TAD K1
3516 7440 SZA /CHECK STORED ADDRESS
3517 7402 HLT /JMS FAILED
3520 3423 DCA I K1 /CLEAR STORED ADDRESS
3521 1136 TAD PNTCNT
3522 7001 IAC /ADVANCE COUNTER
3523 3136 DCA PNTCNT

/JMS TEST 35 COUNTER=121
3524 1331 TAD RK47
3525 3423 DCA I K1
3526 1332 TAD RK48

3527 3455 DCA I K7777
3530 3455 JMP I K7777
3531 5566 RK47, JMP I K3540
3532 4422 RK48, JMS I K0
3533 7660 M120, -120

3540 3540 *3540
3540 1136 TAD PNTCNT
3541 1370 TAD M121
3542 7440 SZA /CHECK COUNTER
3543 7402 HLT /JMP COUNTER WRONG

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3544 1422 TAD I K0
3545 1022 TAD K0
3546 7440 SZA /CHECK STORED ADDRESS
3547 7402 HLT /JMS FAILED
3550 3422 DCA I K0 /CLEAR STORED ADDRESS

3551 1371 TAD BLCNT
3552 7001 IAC
3553 3371 DCA BLCNT
3554 1371 TAD BLCNT
3555 1372 TAD LIMIT
3556 7640 SZA CLA
3557 5766 JMP I BEL-1
3560 3371 DCA BLCNT
3561 1367 TAD BEL
3562 6046 TFS
3563 6041 TSF
3564 5363 JMP , -1
3565 5766 JMP I , +1
3566 4200 4200
3567 0207 BEL, 207
3570 7657 M121, -121
3571 0000 BLCNT, 0
3572 1200 LIMIT, -6400

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